

What is claimed is:

1. A process for the removal of chloramines from chloramine-containing fluid solutions or streams comprising the step of contacting said solutions or streams with an activated carbon characterized by having present in the graphene structure of the carbon from 0.01 to 10 wt% of aromatic nitrogen species.
2. The process of claim 1 wherein the carbon has been treated by a process of pyrolyzing the carbon while simultaneously passing a gas stream containing NH<sub>3</sub> through a bed of the carbon.
3. The process of claim 1 wherein at least 10% of the nitrogen is positioned as an aromatic center configuration within a graphene layer.
4. The process of claim 2 wherein the gas stream includes both NH<sub>3</sub> and an oxygen-containing gas or vapor.
5. The process of claim 4 wherein the gas stream includes a NH<sub>3</sub>/oxygen-containing gas mixture from the group consisting of NH<sub>3</sub>/CO<sub>2</sub>, NH<sub>3</sub>/O<sub>2</sub>, NH<sub>3</sub>/H<sub>2</sub>O, and NH<sub>3</sub>/NO<sub>x</sub>.
6. The process of claim 5 wherein the NH<sub>3</sub>/oxygen-containing gas mixture is NH<sub>3</sub>/H<sub>2</sub>O.
7. The process of claim 1 wherein the solutions or streams are aqueous.
8. The process of claim 1 wherein the activated carbon is derived from a carbon-containing material.
9. The process of claim 8 where the carbon-containing material contains nitrogen in its chemical structure.

10. The process of claim 8 wherein the activated carbon is derived from a material selected from coal, wood, nut shell, pitch, peat, fruit pit, cellulose, lignin, and agricultural waste materials.

11. The process of claim 1 wherein the pyrolyzing temperature is above about 700°C.

12. The process of claim 1 where the carbon is shaped in the form of a block.

13. The process of claim 3 where the carbon is shaped in the form of a block.

14. The process of claim 9 where the carbon is shaped in the form of a block.

15. The process of claim 1 wherein the carbon is characterized by the presence in the graphene structure of the carbon of from 0.02 to 7 wt% of aromatic nitrogen species.

16. The process of claim 15 wherein the carbon is characterized by the presence in the graphene structure of the carbon of from 0.03 to 5 wt% of aromatic nitrogen species.

17. An activated carbon useful for the removal of chloramines from chloramine-containing fluid solutions or streams wherein the carbon is characterized by the presence in the graphene structure of the carbon of from 0.01 to 10 wt% of aromatic nitrogen species.

18. The carbon of claim 17 wherein the solutions or streams are aqueous.

19. The carbon of claim 17 wherein the activated carbon is derived from a carbon-containing material.

20. The carbon of claim 19 wherein the activated carbon is derived from a material selected from coal, wood, nut shell, pitch, peat, fruit pit, cellulose, lignin, and agricultural waste materials.

21. The carbon of claim 17 wherein at least 10% of the nitrogen is positioned as an aromatic center configuration within a graphene layer.

22. The carbon of claim 17 wherein the carbon has been treated by a process of pyrolyzing the carbon while simultaneously passing a gas stream containing NH<sub>3</sub> through a bed of the carbon.

23. The carbon of claim 22 wherein the gas stream includes both NH<sub>3</sub> and an oxygen-containing gas or vapor.

24. The carbon of claim 23 wherein the gas stream includes a NH<sub>3</sub>/oxygen-containing gas mixture from the group consisting of NH<sub>3</sub>/CO<sub>2</sub>, NH<sub>3</sub>/O<sub>2</sub>, NH<sub>3</sub>/H<sub>2</sub>O, and NH<sub>3</sub>/NO<sub>x</sub>.

25. The carbon of claim 24 wherein the NH<sub>3</sub>/oxygen-containing gas mixture is NH<sub>3</sub>/H<sub>2</sub>O.

26. The carbon of claim 23 wherein the pyrolyzing temperature is above about 700°C.

27. The carbon of claim 17 wherein the carbon is characterized by the presence in the graphene structure of the carbon of from 0.02 to 7 wt% of aromatic nitrogen species.

28. The carbon of claim 27 wherein the carbon is characterized by the presence in the graphene structure of the carbon of from 0.03 to 5 wt% of aromatic nitrogen species.

29. The carbon of claim 19 wherein the carbon-containing material is in the form of a single compound comprising nitrogen in its chemical structure.

30. The carbon of claim 21 wherein the carbon is shaped in the form of a block.

31. The carbon of claim 27 wherein the carbon is shaped in the form of a block.

32. The carbon of claim 28 wherein the carbon is shaped in the form of a block.